

Installing Synthesis and ArcExplorer™

Synthesis Reference Manual One

The Synthesis team appreciates your comments, especially if you find any instructions confusing or difficult to follow. For assistance, please contact:

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Pre-Setup Checklist and Advisory

Before you proceed with the installation of *Synthesis*, please read through the pre-installation checklist and advisory notice.

Pre-Installation Checklist

1. You must have administrative privilege for the computer on which you are installing the *Synthesis* and ArcExplorer™ software.
2. Turn off any virus protection software that is running on your computer.
3. Uninstall any previous version of *Synthesis* or AQUIMS using the "Add/ Remove Programs" function in the "**Control Panel**" under the **Start** menu.
4. If you encounter difficulty removing a previous version of *Synthesis* or AQUIMS software using "Add/Remove Programs"
 - a. Delete the *Synthesis* program folder (located under C:\ Program Files and containing synthesis.exe and synadmin.exe, and accompanying files).
 - OR**
 - b. Delete Aq.exe and accompanying program files (located in the AQUIMS folder at root). Remaining embedded program files normally removed during the uninstall process will be overwritten and updated with the new version.
5. **If you have NOT created/added any data of your own**, delete the *Synthesis* data folder located at root and containing subdirectories (db, docs, etc.) or the AQUIMS subdirectories (db, docs, etc.) located at root. If you **HAVE** added data of your own, please contact the *Synthesis* development team before proceeding. Contact information is listed on the first page of this manual.

Pre-Installation Advisory Notice

1. Check available space on the drives where you will install the program files and data. Insufficient disk space will prevent completion of the software:
 - a. *Synthesis* program files require a minimum of 12 MB space (4 MB for Administration, 8 for RunTime).
 - b. *Synthesis* data subdirectories (db, docs, effimage, etc.) currently require a minimum of 300 MB, **PLUS** the MB required for each site folder you choose to load.
2. Install both *Synthesis Administration* and *Synthesis Runtime* for users who will be managing/administering your data.
3. Install **ONLY** *Synthesis Runtime* on the computers of those who will only be using the system to access data.
4. **Use the "Typical" installation option for most users**
5. Use the **"Custom"** installation option **ONLY** for those users who have a valid MapObjects™ license (**See critical instruction on the next page**). The **"Custom"** option loads additional files for running MapObjects™ based applications, such as the Aquatic Chemistry Decision Support System or the Petersburg Cultural Resource MapObjects™ applications.

Pre-Installation Advisory Notice

Installing under the "**Custom**" option requires a **Version 6.0** of **Msvcrt.dll**. Copies of **Msvcrt.dll** for **Windows™ NT 4.0**, **Windows™ 2000**, **Windows™ 98**, and **Windows™ 95** are included on the *Synthesis* CD in the MSVCRT folder.

NOTE: Before attempting a "**Custom**" installation, check the version number of the Windows™ system file: **Msvcrt.dll** which is located at C:\Winnt\system32 if you are running Windows NT or Windows 2000. If you are running **Windows 95** or **98**, the **Msvcrt.dll** is located at C:\Windows\System.

If you cannot locate the **Msvcrt.dll** file and an error message appears, put the **Msvcrt.dll** file into the folder of application that isn't working. For example, If Synthesis Runtime isn't working put the **Msvcrt.dll** file into **C:\Program Files\SynthesisRuntime**. If Synthesis Administration isn't working put that file into **C:\Program Files\Synthesis Admin**.

To replace an older version of this file, you must **close Windows Explorer™**. Open **Command Prompt** under the Windows™ **Start** menu. Use the commands shown in the graphic at right. If you are running Windows™ 95 or Windows™ 98, The path will be to the directory of the program that is not working.

Section One:

Installing Synthesis Administration

Installing Synthesis Administration

Install *Synthesis Administration* only on computers of the staff who will be responsible for data entry and management. *Synthesis Administration* provides the tools and functions for data entry and management, and setting up user profiles.

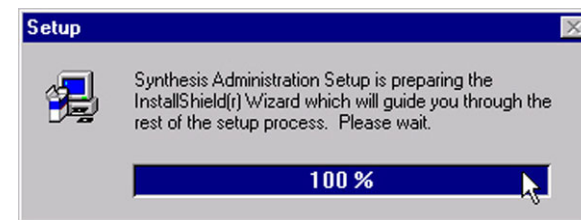
When the *Synthesis* CD is inserted into the CD drive, the installation CD should autorun and the window seen at the upper-right should automatically appear. Click on **Install the Synthesis Administration Program**.

If this window does not automatically appear, click on the Windows™ **Start** button, **Run** and **Browse**. Navigate to the CDROM drive and click on **Setup.exe**. The window to the upper right should appear. **Click on Install the Synthesis Administration Program**.

Install Shield(r) & Welcome Screen

The setup program will now lead you through the installation.

When the "**Welcome**" screen appears, click on **Next** to continue the installation.



Closing All Other Programs

Make sure you have closed all Windows™ programs. If you need to close a Windows™ program at this point, click on **Cancel**, and **Exit Setup** in the subsequent window to close the program. Then, restart the installation. Otherwise, click on **Next**.

Choosing the Destination Location

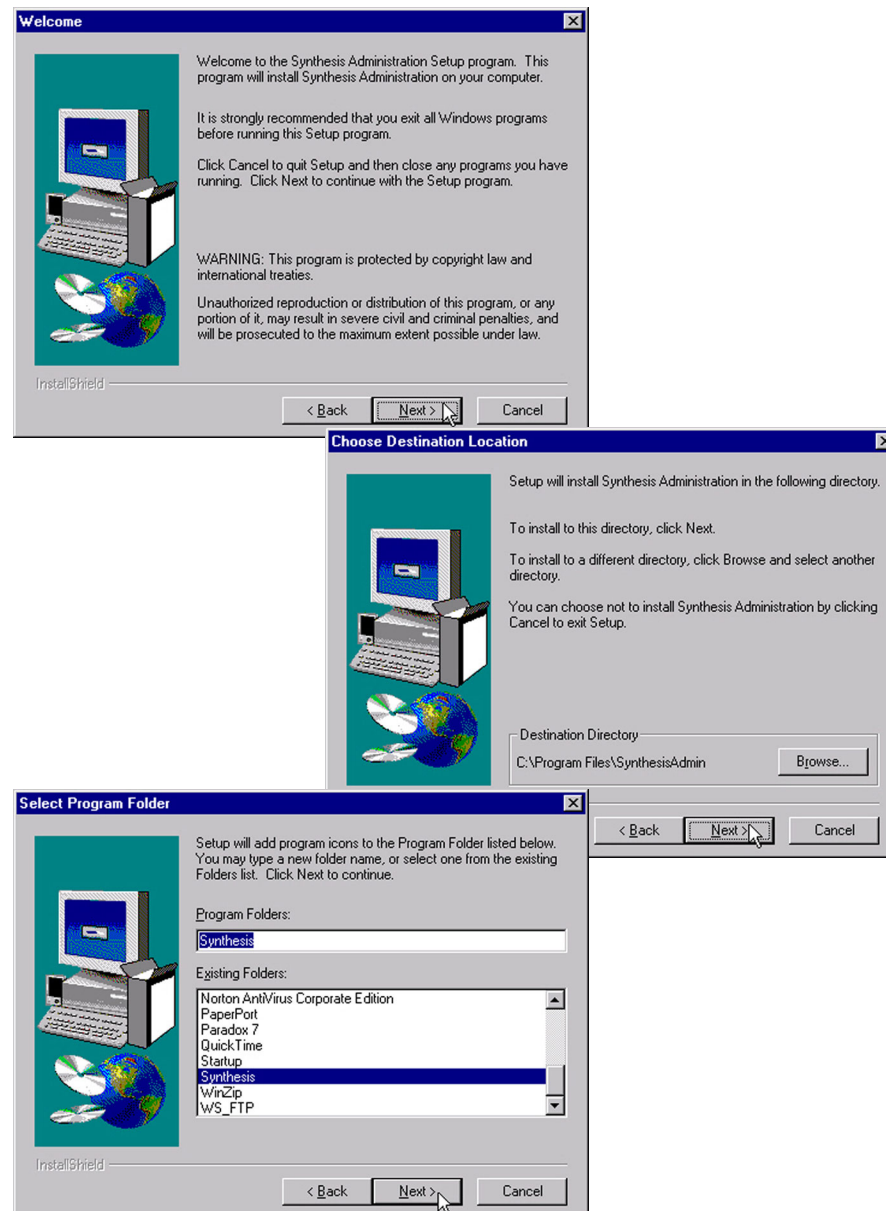
The default installation path is **C:\Program Files\SynthesisAdmin**. The path will be appropriate for most users.

If you wish to install at a different location, click on **Browse** to select and set a different installation path and directory.

Otherwise click on **Next**.

Selecting the Program Folder

A program folder called "*Synthesis*" will be added to the start menu on your computer. The *Synthesis* program shortcuts and icons (both *Administration* and *Runtime*) will be installed in this folder. Click on **Next**.

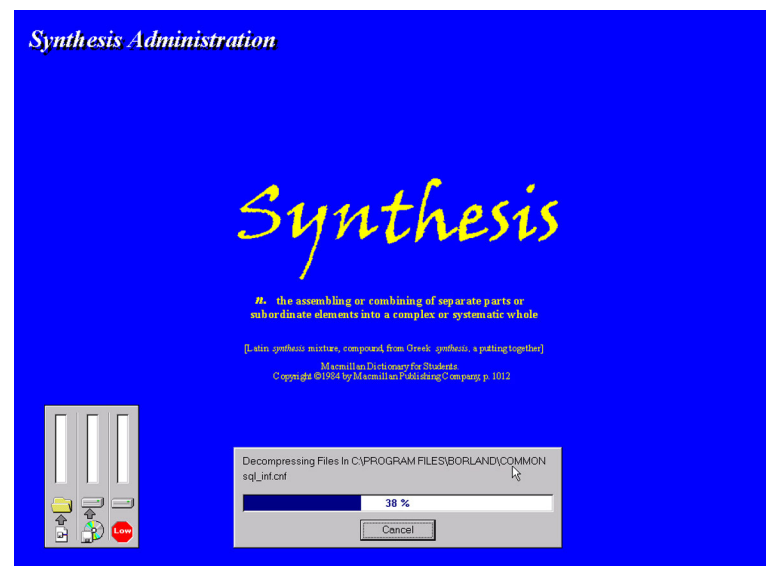
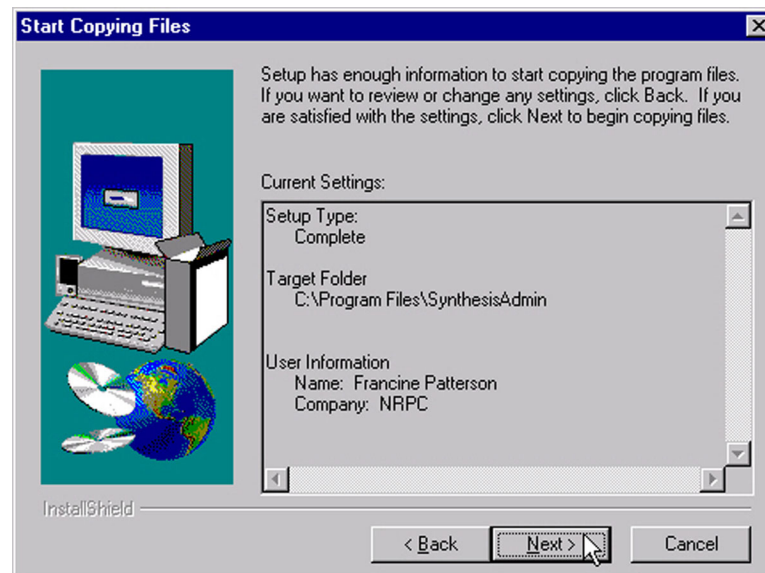


Copying the Files

The program will now be installed. Check the information listed under "**Current Settings**" and ensure that everything is correct.

If something is **incorrect**, such as the path, click on **Back** and change the settings in the appropriate window. Then, proceed with the installation.

Otherwise, if the settings are **correct**, click on **Next**. The necessary files will be copied. When the files have been copied, the opening install dialog will reappear.



Section Two:

Installing Synthesis Runtime

Installing Synthesis Runtime

To install the *Synthesis* Runtime program (the user application), click on Install the runtime version of *Synthesis*. The steps for installing the runtime version of *Synthesis* are the same as those for *Synthesis Administration*.

Install Shield(r) & Welcome Screen

The setup program will now lead you through the *Synthesis* Runtime installation program.

When the "**Welcome**" screen appears, click on **Next** to continue the installation.

Closing All Other Programs

Make sure you close all Windows™ programs. If you need to close a Windows™ program, click on **Cancel**, and Exit Setup in the subsequent window to close the program. Then, restart the installation.

Otherwise click on **Next**.

Choosing the Destination Location

The default installation path is **C:\Program Files\SynthesisRuntime**. That path will be appropriate for most users.



Choosing the Destination Location

If you wish to install at a different location, click on **Browse** to select and set a different installation path and directory. Then, click on **Next**.

Choosing the Setup Type

Choose setup type: "**Typical**" and click on **Next**.

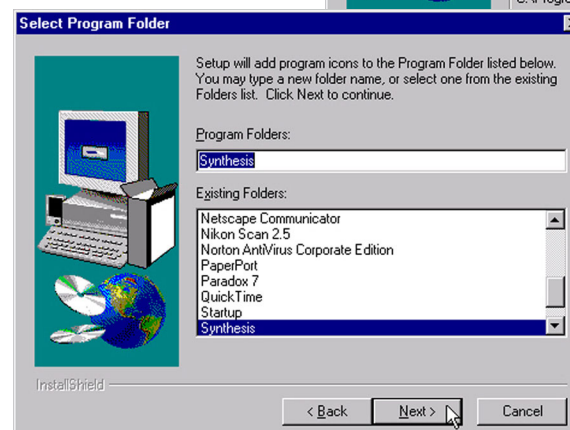
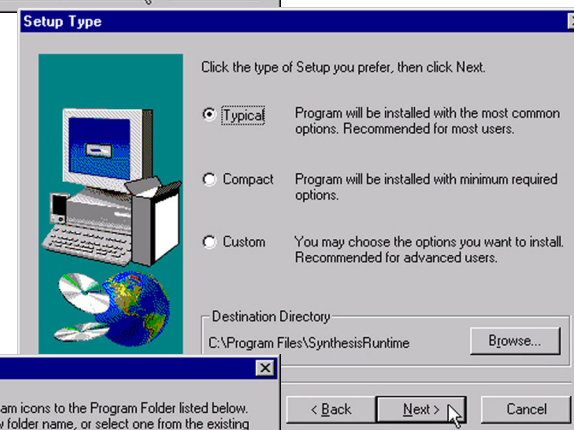
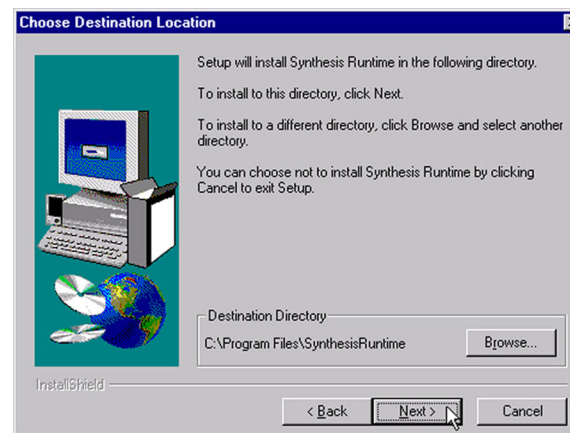
NOTE: Use the "**Custom**" installation option **ONLY** for those users who have a valid MapObjects license. If installing under the "**Custom**" option, refer to the critical instructions outlined on pages ii and iii. These instructions explain the procedure for replacing the **Msvcr7.dll** file prior to installing under the "**Custom**" option.

The "**Custom**" option loads additional files for running MapObjects™ based applications, such as the the Aquatic Chemistry Decision Support System or the Petersburg NB Cultural Resource MapObjects™ applications.

Selecting the Program Folder

A program folder called "*Synthesis*" will be added to the start menu on your computer. The *Synthesis* program shortcuts and icons (both *Administration* and *Runtime*) will be installed in this folder.

Click on **Next**.



Copying the Files

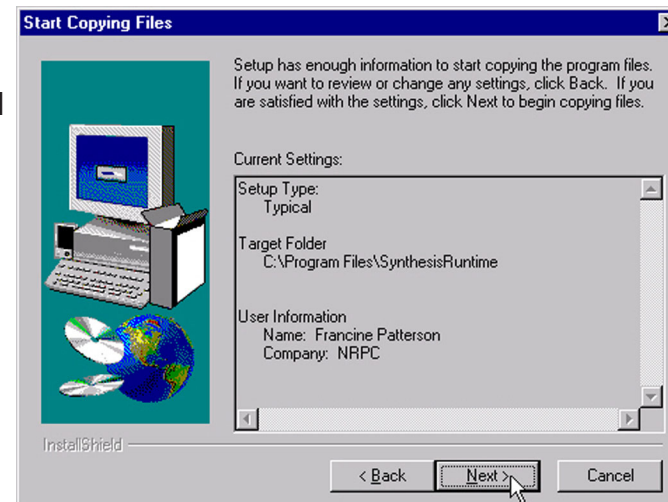
The program will now be installed. Check the information listed under "**Current Settings**" and ensure that the settings listed are correct.

If something is **incorrect**, click on **Back** and change the settings in the appropriate window. Click on **Next** and proceed with the installation.

Otherwise, if the settings are **correct**, click on **Next**.

When the files have been copied, the opening install dialog box will reappear. To close the window, click on the "X" in the upper right-hand corner of the dialog box.

NOTE: If you are installing only program files (*Synthesis Administration* and/or *Synthesis Runtime*) and are not installing data, proceed to Section Four: Setting Up New Users and Logging into Synthesis Administration.



Section Three:

Installing the Synthesis Data

Installing the Synthesis Data

Once the application files are installed, the *Synthesis* data must be installed in a separate *Synthesis* (data) folder on the drive of your choice. The data are installed using *Synthesis Administration*.

Use either the desktop icon you have created, or navigate to the **Programs** menu under the **Start** button, to locate and open *Synthesis Administration*.

Click on **Install data from CD or local network** under the **File** menu in *Synthesis Administration*.

NOTE: This is a common error point. Please carefully read the instructions. First, you will identify where to find the data and then where to put it.

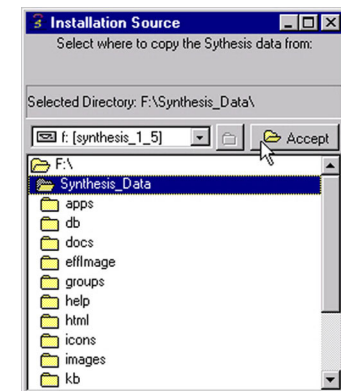
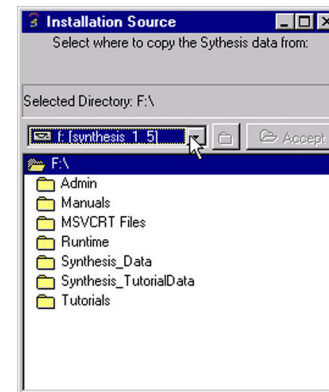
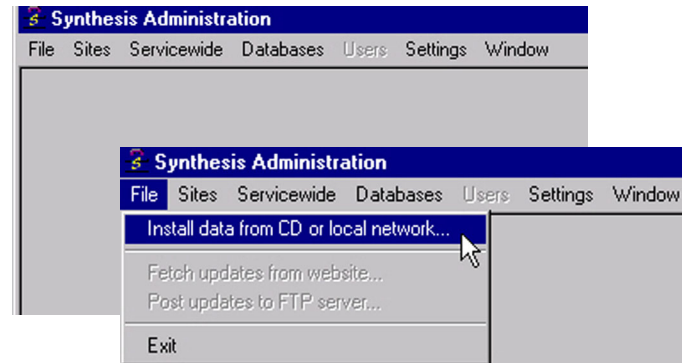
Selecting Where to Copy Data From

The program now asks you to locate the data **source**.

The data are located on your *Synthesis* installation CD. Select your CD drive from the drive-selection drop-down menu.

Locate and double-click on the *Synthesis_Data* folder. You will see a list of subdirectories appear below the *Synthesis_Data* directory.

Click on **Accept**.

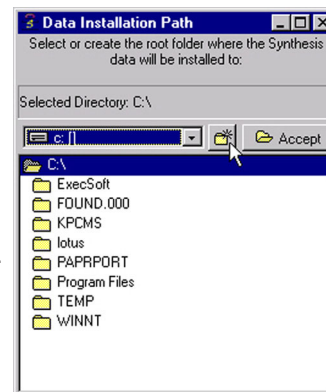


Selecting Where to Install the Data

The data are installed in a *Synthesis* (data) folder. You need to decide on which drive you want to install the data: a local hard drive on a network server. **The default drive is C:\.**

Click on the drive where the data will be installed. Then, click on the **"Create new directory"** icon to the right of the drive-selection drop-down menu. You will see a *Synthesis* folder created at root on that drive.

Click on **Accept**.



Selecting Sites for Which Data Will Be Installed

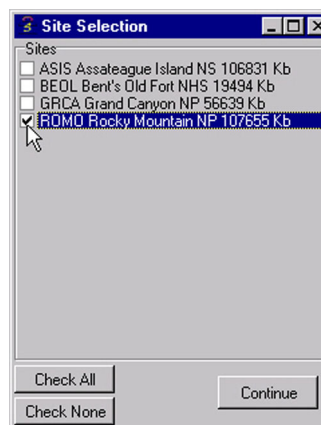
You may select any of the sites included on your CD by clicking in the box next to the site name.

To install all sites, click on **Check All** in the bottom left-hand corner of the window.

Once you have finished choosing the sites for installation, click on **Continue**.



NOTE: Your system must be using the small font display setting in order to continue with the rest of the installation. This setting can be changed under the display properties control panel.



Transferring Files

Please wait while the data are installed. Depending on the number of sites for which you install data available for each site, and the speed of your computer, the process can take up to 30 minutes.

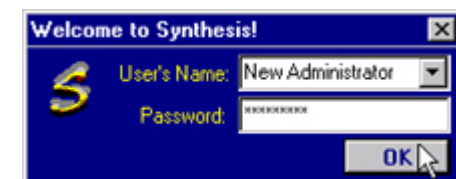
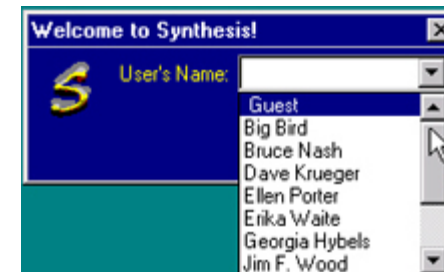
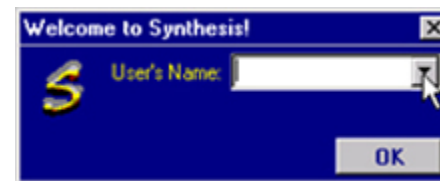
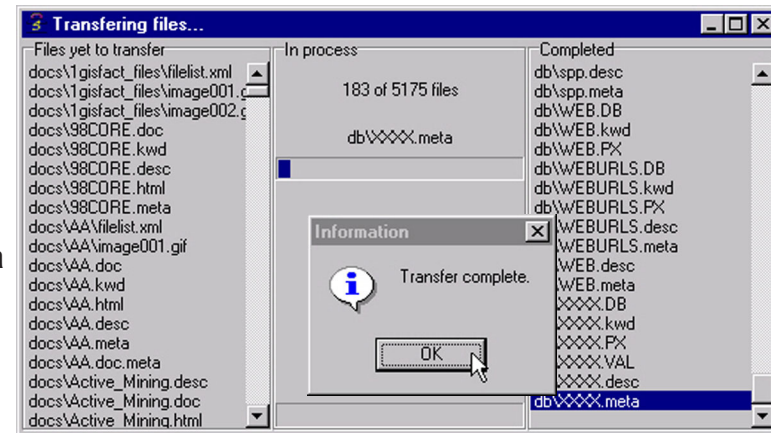
When the **"Information"** screen to the right appears, the data transfer is complete and the data have been installed. Click on **OK**.

The login screen will appear. Select the user name **New Administrator** from the drop-down menu. Or begin typing the user name **New Administrator** and it will appear in the user name slot.

Type the New Administrator password: **synthesis**

Click on **OK**.

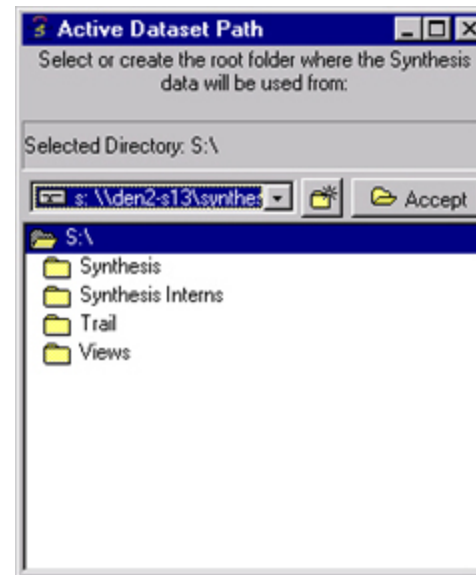
Synthesis Administration will open. Under the **Sites** menu, check to see that all of the sites you intended to install are listed.



Under the **Settings** menu, click on **Active Dataset Path**. Check that the dataset path is correct; that is, the drive and folder(Synthesis) shown is the one you selected during data installation.

If the dataset path is correct, proceed to the **Section Four** (p. 15).

If the dataset path is not correct, proceed to section four and the part entitled **Setting the Active Dataset Path** (p. 18). Set the dataset path correctly and then return to **Section Four**.



Section Four:

Setting Up New Users and Logging into Synthesis Administration

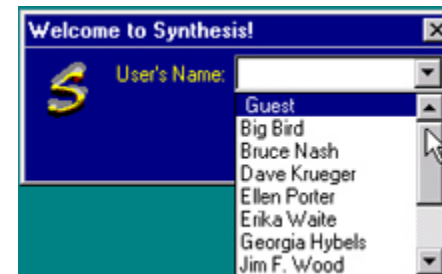
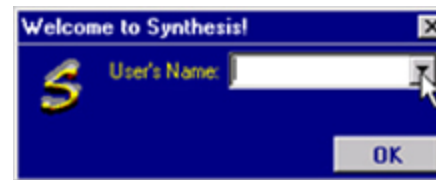
New Users in Synthesis Administration

NOTE: You cannot run *Synthesis Administration* and *Synthesis Runtime* simultaneously.

The login screen will appear whenever you run either the *Synthesis Runtime* or the *Synthesis Administration* program. Use either the desktop icon you have created, or navigate to the **Programs** menu under the **Start** button, to locate and open *Synthesis Administration*. Login to *Synthesis Administration* as **New Administrator**. Select this login name from the drop-down menu.

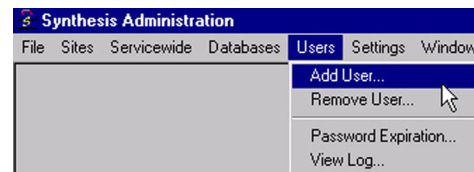
Type the New Administrator password: synthesis

Click on **OK**.



Adding Self as New Administrator

In *Synthesis Administration*, select the **User** menu and click on **Add User**.



Select **Administrator** from the **User access level** options to give yourself access to all administrative permissions, including user and data management.

Type in your new user name (at least six characters long). As you type, the program will fill in the remaining boxes with the appropriate information. Click on **OK**.



When you log in for the first time under your new user name, your password will be your user name **EXACTLY** as it appears, including uppercase letters and spaces.

NOTE: We recommend that you add other users, especially those requiring *Synthesis Administration*, at this time.

Adding Other New Users

Select the **Add User** options from the **Users** menu in *Synthesis Administration*. Type the user's name into the **User's Name** box. As you type, the program will fill in the remaining boxes with the appropriate information.

Select the appropriate access level:

1. **"Administrator"** - users with user administration and data management duties.
2. **"Technician"** - users with data management duties
3. **"Official"** - general users having the *Runtime* version only.

Once you assign the appropriate access level, click on **OK**.

Close out of the program, and then launch ***Synthesis Administration*** again.

REMIND NEW USERS: The first time they login under their user name, their password will be their user name **EXACTLY** as it appears, including uppercase letters and spaces.



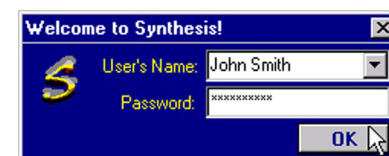
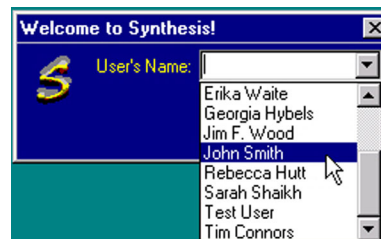
Logging into Synthesis Administration

NOTE: You cannot run *Synthesis Administration* and *Runtime* simultaneously.

Begin typing your name, or click on the down arrow to get the drop-down list of users. **Select your user name.** You will be asked for your password.

The first time you login to *Synthesis Administration* under your user name, your password is **EXACTLY** as it appears in front of you, including uppercase letters and spaces.

Click on **OK**.

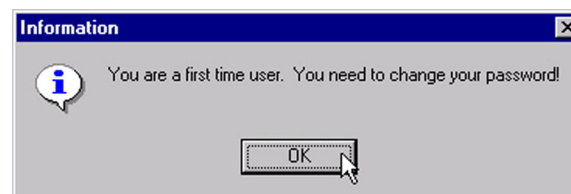


Changing Your Password

Once you login to *Synthesis Administration*, the program will ask you to provide a new password. This will be your password from this point forward, or until you change it. By default, user passwords are set to never expire (except if you forget it).

Type your old password (your name EXACTLY as it appears in front of you). Then type a new password. It must be at least **six** characters and can contain both letters and numbers. Then, retype (verify) your new password and click on **OK**.

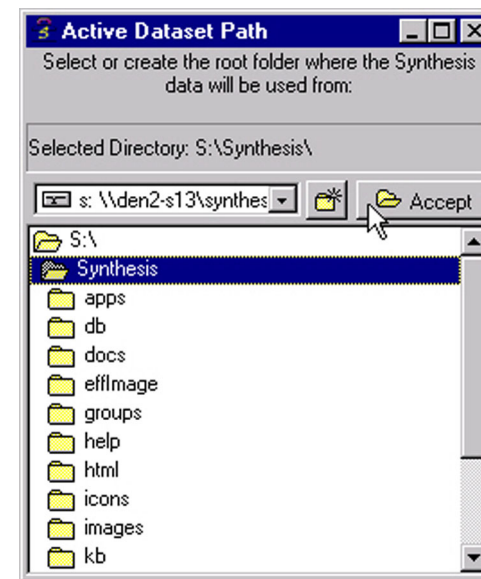
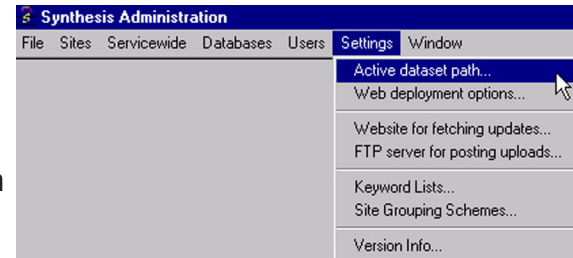
NOTE: For further instructions on using *Synthesis Administration*, See **Manual Two**. For instructions on using the *Synthesis Runtime* version see **Manual Three**.



Setting the Active Dataset Path

Also, instruct the data manager(s) on how to set the active dataset path whenever *Synthesis Administration* is installed or reinstalled. The active dataset path for *Synthesis Administration* is set using the "**Active dataset path**" option under the **Settings** menu in *Administration*. The dialog box looks the same as the `destination` dialog box in the `data` install process.

Select the **drive** on which you installed the data. Then double-click on the **Synthesis** data folder. You should see the list of subdirectories, such as `db`, `docs`, `effImage`, drop down. Click on **Accept**.



Section Five:

Logging into Synthesis Runtime and Locating the Root Data Folder

Synthesis and the Root Data Folder

Once you have set the active dataset path and setup users, you (as the administrator) must login to *Synthesis* and locate the root data folder.

Logging into *Synthesis*

Use either the desktop icon you have created, or navigate to the Programs menu under the Start button, to locate and open *Synthesis*. When you open *Synthesis*, you will be able to login as yourself.

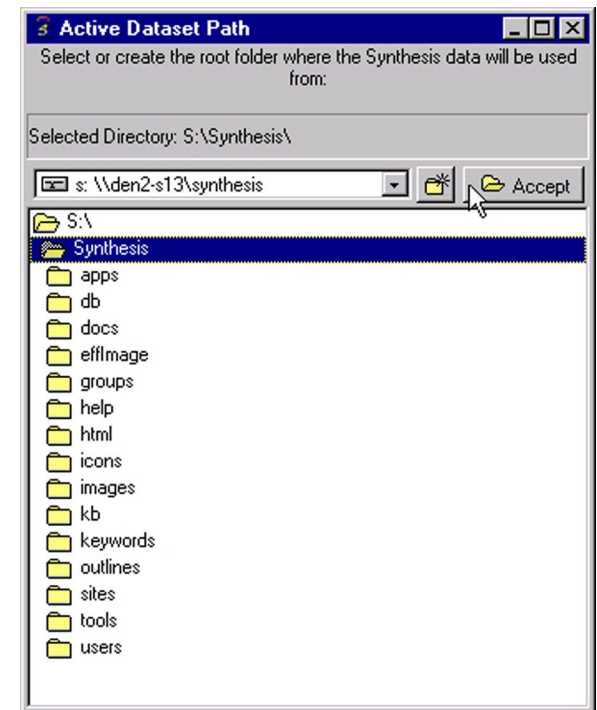
NOTE: You cannot run *Synthesis Administration* and *Synthesis* simultaneously.

Begin typing your name, or click on the down arrow to get the drop-down list of users. Select your name. You will be asked to type in your password. Click on **OK**.

Locating the Root Data Folder

To locate the **root directory**, navigate to the *Synthesis* data directory. Double-click on the *Synthesis* data directory, and click **Accept**.

NOTE: As administrator, you must locate the root data folder for each computer you install *Synthesis* on. General users will not necessarily know the location of the *Synthesis* data folder.



Section Six:

Installing ArcExplorer™

Installing ArcExplorer™

GIS data are displayed in *Synthesis* using ArcExplorer™ and ArcView™. ArcExplorer™ is a free application distributed by ESRI, and we have included it on the *Synthesis* installation CD along with the instruction manual in pdf. format (arcexplorer.pdf). Administrative privilege is required to install ArcExplorer™.

NOTICE: "ArcExplorer software is the intellectual property of ESRI and is used herein under license. Copyright 1998 ESRI. All rights reserved. ESRI and MapObjects are registered trademarks in the United States and are either trademarks or registered trademarks in all other countries where they are used, and ArcExplorer is a trademark of Environmental Systems Research Institute, Inc."

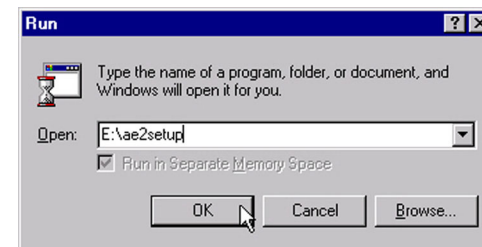


Installing ArcExplorer

To install ArcExplorer™, click on the Windows™ **Start** button. Click on **Run** and then on **Browse** to locate the **ae2setup.exe** file. Navigate to the CDROM drive, locate and double-click on the program file: **ae2setup.exe**.

Selecting the Destination Directory

The default destination directory for the installation of ArcExplorer™ is **C:\Program Files\ESRI\Arcexplorer**. You may choose to install to a different drive, such as D:\. In that case, the path will be



D:\ProgramFiles\ESRI\Arcexplorer

Follow the instructions on the screen as they lead you through the installation of ArcExplorer™.

